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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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05/09/2001

Thomas Sonderman

2000.044700

3951

23720

7590

05/19/2006

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EXAMINER

JARRETT, RYAN A

ART UNIT

PAPER NUMBER

2125

DATE MAILED: 05/19/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/851,905	SONDERMAN ET AL.	
	Examiner	Art Unit	
	Ryan A. Jarrett	2125	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 27 February 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,3-11,13-21,23-41 and 43-61 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3-11,13-21,23-41 and 43-61 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Response to Amendment

1. The reply filed on 2/27/06 is not fully responsive to the prior Office Action because of the following omission(s) or matter(s):

Applicant has not fully responded to 35 U.S.C. 112 2nd paragraph rejection on pages 7 and 8 of the Office Action mailed 11/23/05. The 35 U.S.C. 112 2nd rejection was two-pronged. Applicant did not respond at all to one prong of the rejection, and the response to the other prong was not fully responsive. This rejection is reproduced below, with Examiner comments inserted where appropriate:

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1, 3-11, 13-21, 23-41, and 43-61 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Regarding claims 1, 11, 21, 31, 41, 51, and 61, Applicant recites the limitations “target life of the sputter target” and “modeling”. Based on Applicant’s arguments filed 8/31/05, the meaning of these limitations has been rendered indefinite. Based on Applicant’s arguments filed 8/31/05, it appears that Applicant intends for these terms to have a definition contrary to their ordinary meaning.

On page 23 of the Response filed 8/31/05, Applicant states, “Merely disclosing the age of the cathode does not relate to the target life of the sputter target as called for by claims of the present invention.” Thus, according to the Applicant, the age or life of the sputtering cathode is different from the age of life of the sputtering target. However, the sputter target of *Turner* comprises a cathode. The target and cathode are essentially one and the same. Therefore, it is not clear what Applicant intends the

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meaning of “target life of the sputter target” to be, if it cannot be construed to mean the “age of the sputter target cathode”.

Applicant’s response to the above argument can be found on page 20 of the Response filed 2/27/06. However, this argument is not fully responsive in light of the following:

Applicant continues to argue that the “cathode” of Turner does not equate to the claimed “target”. Applicant’s only support for this argument is the assertion that Turner uses the term “cathode” differently from the term “target”. Applicant asserts that the “cathode supply 16” of Turner equates to the “cathode”, and thus the “cathode” must be different from the “target” since Turner uses the term “cathode supply 16” in the same sentence as the term “target”. However, the “cathode supply 16” actually equates to a power “supply” attached to the cathode, rather than the cathode itself. Moreover, it doesn’t matter even if Turner does use the two terms in different parts of the disclosure. Since the two terms mean the same thing, they can be used interchangeably in the disclosure.

The fact of the matter is, Turner actually directly equates “target” to “cathode” @ column 1 line 20 of the specification. Here, Turner discloses “target (cathode)”. Therefore, Applicant’s continued argument that the “age of the cathode” of Turner does not correlate to the claimed “target life of the sputter target” is simply non responsive. In order to move the prosecution forward, Applicant must properly respond to the fact that Turner directly correlates “target” to “cathode”, and in light of this explain

how the “age of the cathode” of Turner cannot then correlate to the claimed “target life of the sputter target”.

On page 23 of the Response filed 8/31/05, Applicant states, “**Turner** discloses that the current drawn from the cathode supply is controlled in response to power dissipated in the plasma, the cumulative usage of the particular target, the pressure and the desired deposition rate...However, **Turner** does not disclose modeling these relationships.” Examiner has associated the function of **Turner** (col. 3 line 28) relating the plasma power, cathode (target) age, and deposition rate with the claimed “modeling”. But, according to the Applicant, an empirically obtained mathematical “function” cannot be construed to be “modeling”. Therefore, it is not clear what Applicant intends the meaning of “modeling” to be, if it cannot be construed to mean an empirically obtained mathematical “function”.

Applicant has not responded at all to the above argument. In order to move the prosecution forward, Applicant must properly respond to this argument.

Applicant has the right to act as his or her own lexicographer to specifically define a term of a claim contrary to its ordinary meaning, but the written description must clearly redefine the claim term and set forth the uncommon definition so as to put one reasonably skilled in the art on notice that the applicant intended to so redefine that claim term. *Process Control Corp. v. HydReclaim Corp.*, 190 F.3d 1350, 1357, 52 USPQ2d 1029, 1033 (Fed. Cir. 1999). The terms “target life of the sputter target” and “modeling” in the claim are indefinite because the specification does not clearly redefine the terms, and since Applicant argues that the terms mean something other than their ordinary meaning.

Claims 3-10 depend from claim 1, claims 13-20 depend from claim 11, claims 23-30 depend from claim 21, claims 32-40 depend from claim 31, claims 43-50 depend from claim 41, and claims 52-60 depend from claim 51 and thus incorporate the same deficiencies.

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See 37 CFR 1.111. Since the above-mentioned reply appears to be *bona fide*, applicant is given **ONE (1) MONTH or THIRTY (30) DAYS** from the mailing date of this notice, whichever is longer, within which to supply the omission or correction in order to avoid abandonment. EXTENSIONS OF THIS TIME PERIOD MAY BE GRANTED UNDER 37 CFR 1.136(a).

Conclusion

2. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ryan A. Jarrett whose telephone number is (571) 272-3742. The examiner can normally be reached on 10:00-6:30 M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Leo Picard can be reached on (571) 272-3749. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Ryan A. Jarrett
Examiner
Art Unit 2125

5/8/06
RAJ

A handwritten signature in black ink, appearing to read 'RAJ' followed by a stylized flourish.